The Columbia River Basin
(Washington, Oregon and Idaho)

Our Goal: *To protect public health and the environment in the Columbia River Basin by improving water quality and restoring healthy populations of pacific salmon.*

Background

Multiple public and private interests derive economic, social or subsistence value from the Columbia River and its tributaries throughout Washington, Oregon and Idaho, including hydro-electric power generation, irrigation, water supply, transport, fisheries, and recreation. Sixty-nine out of 200 historical salmon stocks on the Columbia River have become extinct, and another 75 are at risk. Additionally, water quality is listed as impaired (not meeting water quality standards) for temperature, total dissolved gas, dissolved oxygen, and other toxic substances, which pose risks to salmon stocks and human health.

The Focus of Our Efforts

EPA shares responsibility with numerous federal, state and tribal agencies for managing the Columbia River and protecting water quality. Our primary focus is on developing the scientific tools and assessments necessary to make informed decisions about how best to accomplish that, and to issue a TMDL – Total Maximum Daily Load – which will set targets to achieve water quality standards for temperature and total dissolved gas. We are also completing fish and sediment contamination surveys to help reduce the health risks associated with eating contaminated fish (a major concern for tribes who depend on fisheries for subsistence) and to focus additional future efforts.

Key Actions: Next 1-2 Years

- ➔ Quantify the extent of sediment contamination by metals, pesticides and PCBs in the upper reaches of Lake Roosevelt. Estimate of the public health risk from contamination. Determine whether further detailed investigation of the upper Columbia River is necessary. (Upper Columbia River Sediment Contamination Study)
- ➔ Quantify the total dissolved gas (TDG) levels on the Columbia River, establish allowable loads of TDG that will result in compliance with WQS.(State and EPA TMDLs for total dissolved gas).
- ➔ Quantify temperature problems on the Columbia River. Identify the main causes of increased temperature. Determine target temperatures to be achieved on the river and reductions in temperature necessary to achieve water quality standards (EPA TMDL for Temperature).

Environmental Outcomes by 2007

- _ State, Tribal, Federal and Local agencies are taking the actions along the Columbia River necessary to achieve water quality standards for total dissolved gas and temperature as laid out in State Implement Plans for the TMDLs.
- _ Appropriate action under CERCLA is being implemented on the Upper Columbia to remediate contaminated sediments.

Environmental Indicators for Measuring Success

- Water temperature in the Columbia and Snake Rivers
- Total dissolved gas levels in the Columbia and Snake Rivers
- Contaminant levels in fish tissue
- Contaminant levels in sediment

This graph
illustrates the
improvement in mean temperature that would result from successful implementation of the Temperature TMDL.